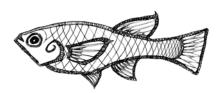
DRAFT SAFE HARBOR AGREEMENT FOR TOPMINNOW AND PUPFISH IN ARIZONA

Between the Arizona Game and Fish Department and the U.S. Fish and Wildlife Service





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Draft – February 3, 2004 – Draft

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COVER ILLUSTRATIONS

Marco Mazzoni

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Draft Safe Harbor Agreement for Topminnow and Pupfish in Arizona

Arizona Game and Fish Department February 3, 2004

1.0 Introduction

This Safe Harbor Agreement (Agreement) between the U.S. Department of the Interior Fish and Wildlife Service (Service or USFWS) and the Arizona Game and Fish Department (Department) has been developed under the Service's Safe Harbor Agreement final regulations (64 FR 32705) and final policy (64 FR 32717). This Agreement implements the intent of the Service and the Department to follow the procedural and substantive requirements of section 10(a)(1)(A) of the Endangered Species Act (ESA) of 1973, as amended.

This Agreement covers the historic ranges of the Gila topminnow (*Poeciliopsis occidentalis*), Yaqui topminnow (Poeciliopsis sonoriensis), desert pupfish (Cyprinodon macularius), and Quitobaquito pupfish (Cyprinodon eremus) on non-federal lands in Arizona (Appendix 1). In Arizona, the Gila topminnow's historic range is the Gila River basin, below around 5200 feet in elevation (Minckley 1999). The Yaqui topminnow is restricted to the Yaqui River drainage in southeastern Arizona (USFWS 1994). The historic range in Arizona for the desert pupfish is the Gila River basin, below 5000 feet in elevation, including the "Gila, Santa Cruz, San Pedro, and Salt Rivers; and the lower Colorado River...downstream from the vicinity of Needles" (USFWS 1993). However, Minckley et al. (2002) suggested that the Santa Cruz River drainage was historically occupied by the extinct Santa Cruz (=Monkey Spring) pupfish, recently described as Cyprinodon arcuatus. This has led to discussion among experts as to whether desert pupfish (C. macularius) should be reestablished in the Santa Cruz drainage, since it has been proposed that C. arcuatus was the species of pupfish historically found in the Santa Cruz drainage (Minckley et al. 2002). Though consensus has not been achieved, it is generally accepted that available suitable habitats in the Santa Cruz drainage should be used for desert pupfish (C. macularius) recovery purposes. Both species of pupfish (C. arcuatus and C. macularius) were extremely similar to each other, and likely ecologically equivalent. Minckley et al. (2002) suggest that the "species are similar enough that they were long confounded under C. macularius" and the "biogeographic considerations suggest that its affinities lie with C. macularius or C. eremus." Regardless of the ultimate origins of C. macularius and C. arcuatus, the Santa Cruz drainage is historic habitat for the genus Cyprinodon, and potential recovery habitats for C. macularius in the Santa Cruz should be pursued. The third species of pupfish in Arizona, the Quitobaquito pupfish (C. eremus,) occurs in Quitobaquito Spring in the Rio Sonoyta drainage.

Under this Agreement, the Department will issue Certificates of Inclusion to non-federal landowners (Cooperators) who voluntarily agree to carry out conservation efforts for the benefit of topminnow and/or pupfish. In return for voluntary conservation commitments, the Agreement will extend assurances to the Cooperator allowing future alteration or modification of the enrolled property back to its original baseline conditions. Without this cooperative federal and non-federal effort, the enrolled lands would not otherwise be used by the species in the foreseeable future.

When signed, this Agreement will serve as a basis for the Service to issue a permit under ESA section 10(a)(1)(A) for the take of covered, listed species associated with the potential future return of the enrolled lands to baseline conditions. The permit will authorize take of individuals of the species that are reestablished to the enrolled lands or have increased in numbers and/or distribution on those lands as a result of the voluntary conservation activities. The Service and the Department anticipate that the maximum level of take authorized under this Agreement and permit will never be realized. Permit issuance will not preclude the need for abidance by all other federal, state, and local laws and regulations that may apply.

2.0 BACKGROUND

Although once common throughout most of the Gila River basin (below 5000 feet in elevation), the Gila topminnow and desert pupfish now naturally occur in only a fraction of their historic range (USFWS 1993, Weedman 1999). Both topminnow and pupfish are federally listed under the ESA as endangered throughout their ranges in the United States (USFWS 1967 and USFWS 1986, respectively). The topminnow listing included both the Gila and Yaqui topminnows, and the desert pupfish listing included both the desert and Quitobaquito pupfishes. Habitat loss and alteration and the introduction of nonnative fishes have contributed to declines in natural populations of these two species (Weedman and Young 1997). The location of natural and reestablished populations of topminnow and pupfish, along with life history information, can be found in their respective recovery plans (USFWS 1993, USFWS 1994, Weedman 1999).

2.1 Purpose and need for action

This Agreement is designed to provide suitable aquatic habitats in which to establish populations of topminnow and pupfish and to allow the use of native fish for mosquito control. Past efforts by the Department, the Service, the Bureau of Land Management, and the U.S. Forest Service to reestablish populations of Gila topminnow and desert pupfish were met with varying degrees of success, possibly due to poor site selection (Weedman and Young 1996).

One factor limiting the recovery of topminnow and pupfish is availability of suitable habitat. Permanent water sources, free of nonnative predaceous fishes and within the species' historic ranges, are necessary for the successful establishment of topminnow and pupfish populations. Task 2 in the Desert Pupfish Recovery Plan states that "efforts should be made to reestablish pupfish into a diversity of habitat types reflective of those occupied historically..."(USFWS 1993). Criteria necessary for downlisting the Gila topminnow, as listed in the draft revised Gila Topminnow Recovery Plan, include maintenance of refugia populations (Task 1.1) and reestablishment of Gila topminnows in suitable habitats (Task 2), following geographic guidelines (Weedman 1999).

A need also exists to provide public health and safety via mosquito control. Every summer, natural and manmade water sources in southern and central Arizona act as

breeding grounds for mosquitoes, which are vectors for the transmission of encephalitis and other diseases. Although nonnative mosquitofish (*Gambusia affinis*) have traditionally been stocked into these habitats for mosquito control, the Gila topminnow is as effective for mosquito control as mosquitofish (Childs 2001). Desert pupfish have also demonstrated effectiveness in mosquito control (Walters and Legner 1980). Establishing populations of topminnow and pupfish in these types of habitats would serve to protect public health while assisting in the Recovery Programs for these two endangered fishes.

2.2 Importance of non-federal lands

Recovery plans for the topminnow and the pupfish list reestablishment of these fishes into suitable habitats within their historic ranges as recovery objectives or tasks (USFWS 1993, USFWS 1994, Weedman 1999). Maintenance of genetic stocks and refugia populations in natural, semi-natural, or manmade habitats would aid in recovery efforts for the topminnow and pupfish. The use of non-federal lands for reestablishment efforts will provide:

- 1. Additional suitable aquatic habitats that have previously been largely unavailable for reestablishment of topminnow and pupfish populations;
- 2. Opportunities to increase public awareness of conservation needs for native fishes;
- 3. Opportunities to use native fish for mosquito control while reducing or eliminating the use of the nonnative mosquitofish; and
- 4. Opportunities to develop new partnerships between federal, state, and non-federal landowners to create a new era of trust and improved conservation efforts for threatened and endangered species.

Under the Permit, participating landowners (Cooperators) enrolled with the Department under this Agreement will receive a Certificate of Inclusion (Appendix 2). The Certificate of Inclusion will include:

- 1. A map of the property and the portion of the property to be enrolled;
- 2. Baseline condition of the property as agreed upon by all parties, including a thorough habitat analysis of the enrolled property conducted by the Department, or other qualified parties and approved by the Department; and
- 3. The specific responsibilities of the Cooperator, the Department, and the Service.

This Agreement is a voluntary partnership between the Service, the Department, and non-federal landowners receiving Certificates of Inclusion under the Permit. Under this Agreement it is expected that each party has the commitment and means to implement it.

3.0 Species and Habitats to be Covered in this Agreement

The scope of this Agreement covers all non-federal lands in the State of Arizona occurring within the historic ranges of topminnow and pupfish, excluding Native American lands (Appendix 1). Properties enrolled in this Agreement will be examined by the Department or other qualified individuals to determine habitat suitability. The Department will verify habitat suitability, approve sites, and determine source populations of topminnow and pupfish to be stocked at approved sites in consultation with the Service, as identified in each species recovery plan (USFWS 1993 and Weedman 1999).

3.1 Species covered by the Agreement

This Agreement covers the Gila topminnow (*Poeciliopsis occidentalis*), Yaqui topminnow (*Poeciliopsis sonoriensis*), desert pupfish (*Cyprinodon macularius*), and Quitobaquito pupfish (*Cyprinodon eremus*).

3.2 <u>Habitats covered by the Agreement</u>

Topminnow and pupfish have historically occupied a variety of habitat types (Weedman and Young 1997). In general, suitable habitat consists of relatively shallow (<1m in depth), slow moving water along stream or river margins, ponds, cienegas, and springs (USFWS 1993, Weedman 1999). Both species are associated with aquatic or streamside vegetation, algal mats, and organic debris; they are also adapted to environmental extremes (water salinity and temperature, flooding, etc.) (USFWS 1993, Weedman 1999).

This Agreement covers habitats occurring on non-federal land within the historic ranges of topminnow and pupfish in Arizona including, but not limited to:

- Retention basins;
- Water treatment facilities:
- Groundwater recharge basins;
- Natural or artificial wetlands;
- Springs, marshes, or streams;
- Natural or manmade ponds, lakes, or other catchments; and
- Golf course ponds or other manmade water features.

Although the historic range of topminnow and pupfish is considered to be below 5200 feet in elevation (USFWS 1993, Minckley 1999), we will evaluate and (if appropriate) use potential sites that exist above that elevation on a case-by-case basis.

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If fish have the potential to naturally spread to adjacent landowners' properties, the sites will not be used. This will eliminate potential conflicts with adjacent landowners that do not wish to participate in this voluntary Agreement. However, if adjacent landowners are willing to participate, these habitats will be used. In certain cases, coordination and compliance with federal land management agencies may also be necessary if fish have the potential to naturally disperse from habitats covered under this Agreement onto federal lands.

The landowners who participate in this Agreement may include, but are not limited to:

- Private citizens
- Non-governmental organizations;
- State, county, and local vector control agencies;
- State, city, or county land and water management divisions;
- State, county, and municipal parks;
- Private corporations; and
- The Arizona Game and Fish Commission (as signatory to this Agreement, the Department will enroll aquatic sites on Wildlife Areas or other Arizona Game and Fish Commission properties on a case-by-case basis under separate Certificates of Inclusion).

4.0 Obligations of the Parties

In addition to the following stipulations, all parties will work cooperatively on other issues as necessary to further the purpose of this Agreement. Moreover, nothing in this Agreement shall limit the ability of federal and state conservation authorities to perform their lawful duties and conduct investigations as authorized by statute and by court guidance and direction. The following are the obligations of the Service, the Department, and Cooperators.

4.1 U.S. Fish and Wildlife Service – Arizona Ecological Service Office

- 1. Provide technical assistance and provide information on federal funding programs.
- 2. Does not assume jurisdiction over the premises by the Agreement. The Service assumes no liability for damage except that resulting from its own negligence on the properties covered under this Agreement as authorized by the Federal Tort Claims Act (28 USC 2671-80).
- 3. Will not be held liable to restore the property to its prior condition upon termination or expiration of this Agreement.

- 4. Upon execution of the Agreement and satisfaction of all other applicable legal requirements, the Service will issue a permit to the Department in accordance with ESA section 10(a)(1)(A), authorizing take of the covered species as a result of lawful activities within the enrolled property. The term of the permit will be 50 years. After this time, the permit may be renewed if agreed upon by all parties.
- 5. Provide topminnow and pupfish (or coordinate for appropriate genetic stock to be provided via another agent, such as the Department).
- 6. Ensure the Department is implementing the terms of the Agreement.
- 7. Assist the Department with compliance monitoring and biological monitoring, as necessary, contingent on the availability of funds.

4.2 Arizona Game and Fish Department

- 1. Coordinate with non-federal landowners to determine site suitability.
- 2. Provide technical advice and assistance with obtaining necessary state permits that may be required to fulfill the terms of this Agreement.
- 3. Coordinate with the Service to determine appropriate genetic lineage to be stocked at each property, and conduct the stocking and/or augmentation of topminnow and/or pupfish.
- 4. Coordinate with Cooperators and the Service to determine a schedule for monitoring and reporting on compliance, as identified in section 9 of this Agreement.
- 5. Conduct compliance monitoring on Cooperators' properties as identified in section 9 of this Agreement.
- 6. Assist Cooperators with biological monitoring as deemed necessary by each party, and/or as funds remain available to the Department to conduct monitoring of topminnow and pupfish populations.
- 7. The Department agrees to notify the Service before any planned action that will result in take. The Department agrees to notify the Service within five days of receipt of notice from the Cooperator of any such planned action.

4.3 <u>Cooperators</u>

- 1. Retains all rights to control trespass and access, and retains all responsibility for taxes, assessments, and damage claims.
- 2. Guarantees ownership of the land and warrants that there are no outstanding rights which interfere with this Agreement. A change of ownership shall not change the terms of this Agreement, which shall remain in effect on the described property for the duration of the period specified if the new landowner agrees. Agrees to notify the Department of planned or pending ownership changes at least 30 days in advance.
- 3. Notify the Department 30 days in advance of any planned management activity that may result in take of the species as defined in section 8.1 on the enrolled lands and provide the Department the opportunity to capture and relocate individuals, if warranted.
- 4. Agrees to allow the Department (its members, agents, or assignees) access to the project site, upon reasonable notification by the Department, for wildlife habitat development and management purposes, to inspect work completed, and to perform biological monitoring. All Department members, agents, and assignees will be in uniform and will have proper identification as government employees or agents.
- 5. Agrees to allow the Service (its members, agents, or assignees) access to the project site, upon reasonable notification by the Service, to perform compliance monitoring, as necessary. At least one Service representative will be in uniform, and all will have proper identification as government employees or agents.
- 6. Where applicable and agreed to by the Cooperator, access may be provided for public education and information related to endangered species recovery, conservation of limited resources, and native aquatic ecology.
- 7. The introduction of nonnative competitors or potential disease vectors into native fish habitat shall be prevented or otherwise minimized and controlled via the following measures: (i) commitments by Cooperators to not knowingly engage in releases of bullfrogs, nonnative fish, crayfish, salamanders, turtles, or other wildlife into native fish habitats on participating properties; (ii) commitments by Cooperators to report any observed occurrences of such species in native fish habitat on participating properties to the Department; (iii) commitments by Cooperators to permit access to their land by appropriate personnel necessary to implement control programs for these species (subject to reasonable advance notice); and (iv) where appropriate, and subject to their concurrence, agreement

by Cooperators to conduct control measures when requested by the Department (e.g. temporarily drying out stock tanks that support such species). Any such measures, however, must be compatible with needed activities by the Cooperator.

- 8. Agrees to not transport any topminnow or pupfish from the stocked location to any other location.
- 9. Assumes responsibility for securing any other permits or authorizations as needed to carry out this Agreement.
- 10. Coordinates with the Department to conduct annual population monitoring and reporting as identified in section 9 of this Agreement.

5.0 Baseline Determination

For a Cooperator to participate in this Agreement, the baseline condition of the property to be enrolled must be determined. Under the Service's Safe Harbor Agreement policy (64 FR 32717), baseline conditions are defined as "population estimates and distribution and/or habitat characteristics and determined area of the enrolled property that sustain seasonal or permanent use by the covered species at the time the Safe Harbor agreement is executed between the Services and the property owner."

Each potential property will be surveyed by the Department or other qualified individuals to determine baseline conditions before the issuance of a Certificate of Inclusion (Appendix 2). Baseline conditions will be determined and agreed to in writing by the Department and Cooperator and concurred with by the Service. Baseline conditions may include habitat characteristics and/or species presence. Since topminnow and pupfish most likely do not currently occur on the lands to be covered in this Agreement, it is likely that baseline conditions on most properties covered under this Agreement will be zero.

Cooperator(s) may agree on an elevated baseline condition when appropriate and agreed upon if topminnows and/or pupfish do not already occur on that property. Agreement to an elevated baseline is entirely voluntary for a Cooperator. The Department, with Service concurrence, must determine if an elevated baseline at any particular site supports the goals of the Agreement and furthers the recovery of either species. Properties where an elevated baseline might be most appropriate are those that have natural or semi-natural aquatic habitats and where development of property is not expected to occur in the foreseeable future. By agreeing to this elevated baseline, the population will still exist when taken back to baseline conditions (with a baseline of zero, the population is eliminated when taken back to baseline conditions). Because Level 2 populations in the species recovery plans must persist with little or no human manipulation for at least 10 years (USFWS 1993, Weedman 1999), elevated baseline conditions would be necessary to achieve Level 2 status. Property owners must maintain the elevated baseline value through the term of their agreement.

6.0 Net Conservation Benefit and Contribution to Recovery

The items listed below are specific tasks in the recovery plans intended to lead to downlisting of topminnow and pupfish (USFWS 1993, USFWS 1994, Weedman 1999). Level 1 populations are natural populations occupying historic habitat "and which were not known to have been placed in those habitats by humans" (USFWS 1993). Level 2 and Level 3 populations have been reestablished by humans into habitats within historic range. Level 2 populations occur in natural habitats and should receive a high degree of protection and only require minor management to persist (Level 2 populations are not considered "established" until they have persisted for at least 10 years). Level 3 populations occur in highly modified or manmade habitats, may require extensive management to maintain them, and may be temporary.

Implementation of this Agreement will provide a net conservation benefit for topminnow and pupfish in the following ways:

- 1. Provide refugia populations of topminnow and pupfish as insurance against catastrophic loss of natural populations and which could act as a source of fish for future reestablishment efforts;
- 2. In certain cases, provide Level 2 populations where populations persist for a minimum of 10 years on properties where an elevated baseline has been agreed.
- 3. Provide sources of Level 3 Gila topminnow and desert pupfish for use in genetic exchanges between populations according to criteria identified within their respective recovery plans (USFWS 1993, Weedman 1999);
- 4. Reduce the need to stock mosquitofish, which have contributed to the decline of topminnow and are a continuing threat (Weedman 1999); and
- 5. Provide convenient sites for public education and information related to endangered species recovery, conservation of limited resources, and native aquatic ecology.

A net conservation benefit is expected, whether or not property owners agree upon an elevated baseline. For instance, if the agreed upon baseline of a property is zero, it may be counted as a Level 3 population (as described in the recovery plans).

Net conservation benefit will be obtained through the increase in total numbers of existing populations of topminnow and pupfish. Additionally, the use of topminnows in lieu of mosquitofish will further the effects of net conservation by decreasing new invasions of nonnative mosquitofish. Through the agreement and implementation of elevated baseline conditions (likely to be considered for already existing suitable and secure habitats), it is

anticipated that these populations will exist for longer periods of time, and therefore may count towards recovery efforts as Level 2 populations.

7.0 DURATION

7.1 Agreement Duration

This Agreement and its associated 10(a)(1)(A) permit is in effect for a duration of 50 years following permit signature. At the end of the permit term, properties covered under this Agreement may be taken back to baseline conditions before the permit expires to avoid accruing additional take liability under the ESA. However, the permit and Agreement may be extended beyond the specified terms through amendment, upon agreement by all parties. If the Agreement (and the Departments Section 10(a)(1)(A) permit) expires without renewal, there are several options:

- 1. A new agency or organization could apply for the Section 10(a)(1)(A) permit and issue Certificates of Inclusion to Cooperators;
- 2. Cooperators can apply to receive their own Section 10(a)(1)(A) permit;
- 3. Existing populations may be removed and relocated by the Department and the Service;
- 4. Populations may be taken back to baseline conditions if the Department and the Service decide not to remove individuals.

7.2 Required Conservation Period

Each Certificate of Inclusion issued by the Department to a Cooperator must specify the time period during which the conservation measures identified in the Agreement will be maintained or implemented. This is termed the "required conservation period" and shall be agreed to by the Department and Cooperator.

A minimum of a 10-year commitment is required under this Agreement, but longer periods are allowable and are encouraged. The conservation period agreed to within individual Certificates of Inclusion will depend on several circumstances including whether or not the landowner has any future land use plans, whether or not conservation measures under the Agreement have included a material benefit to the landowner, and the landowner's comfort level. Any required conservation period in excess of 10 years must have the consent of the Cooperator, however, and the specific conservation period agreed to must be specified within the Landowner's Certificate of Inclusion (Appendix 2). In certain situations, a 10-year commitment may not be practicable, and three-year commitments will be granted on a case-by-case basis. Such instances would include

manmade habitats that are anticipated to be relatively temporary and require ongoing management to maintain.

The conservation commitments required under this Agreement include:

- 1. The Cooperator will grant permission to the Department to establish new populations of topminnow and/or pupfish on their lands at suitable sites;
- 2. The Cooperator will grant permission to the Department and Service to conduct biological and compliance monitoring as identified in section 9 of this Agreement;
- 3. The Cooperator will complete any habitat improvement projects or actions consented to in the Agreement;
- 4. The Cooperator will implement the Take Minimization Measures described in section 8.4; and
- 5. The Cooperator will provide appropriate notification as described in section 9.2 through 9.4.

The required conservation period is considered the minimum that a landowner must agree to obtain the program's regulatory assurances. However, the Department anticipates that some Cooperators will continue to implement most or all the Agreement's conservation commitments even after the required conservation period has been satisfied. This is because the Agreement's conservation program is specifically designed to be compatible with current or future land uses. Thus, in most cases Cooperators are expected to have little incentive or need to discontinue their commitments. Nevertheless, Cooperators may, if necessary, terminate their commitments under the Agreement at the end of the required conservation period, and may even terminate or reduce their conservation commitments before the end of the required conservation period, under emergency circumstances, through the "early termination" procedures described in section 6.F of the Certificate of Inclusion.

8.0 Take

Safe Harbor Agreements are written in anticipation of take of listed species at some point in the future (as defined in the ESA the term "take" means to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or attempt to engage in any such conduct). Section 9 of the ESA and Federal regulation prohibits the take of federally listed fish and wildlife species without special exemption. Any incidental take of topminnow and/or pupfish that occurs as a result of the landowners' activities on properties covered under this Agreement would be authorized by the "enhancement of survival permit" issued by the Service to the Department pursuant to section

10(a)(1)(A) of the Act (incidental take is defined in 50 CFR 402.02 as "take of listed fish and wildlife species that result from, but is not the purpose of, carrying out any otherwise lawful activity conducted by a Federal agency or applicant"). However, measures will be implemented to reduce levels of take. In addition, Cooperators must notify the Department 30 days before any action that may result in incidental take (see section 8.4). Management actions that may result in take are listed in section 8.1 below.

8.1 Methods of Take

The following (including, but not limited to) activities that may result in take:

- 1. Contamination of water due to run-off from roadways, agricultural fields, etc.;
- 2. Contamination of water during pesticide application;
- 3. Intentional drying of the habitat;
- 4. Earthwork around occupied habitats;
- 5. Management actions to remove nonnative aquatic species;
- 6. Monitoring of topminnow and pupfish populations as agreed upon in section 9 of this Agreement; and
- 7. Any normal day-to-day land use and management activity as agreed to by the Department and the Cooperator.

In addition to the activities listed above (Items 1-7), extenuating factors beyond the landowners' control could result in loss of topminnow and pupfish. Examples of extenuating factors include, but are not limited to:

- 8. Invasion and predation by species such as nonnative fishes, bullfrogs, crayfish, and others;
- 9. Predation by native or nonnative wildlife such as birds, mammals, reptiles, and amphibians;
- 10. Complete desiccation caused by drought or other actions outside the landowners control:
- 11. Extreme water quality fluctuations resulting from natural causes or outside sources;

- 12. Elimination of the population due to flooding; and
- 13. Other natural events including fire and drought.

8.2 Extent of Take

The first three actions listed in section 8.1 above could result in complete (100%) take of both topminnow and pupfish from lands covered in this Agreement. The next four management actions (Items 4-7 in section 8.1) are not expected to result in complete (100%) take of either species. Isolated individuals could be subject to take during these routine activities; however, it should be noted that none of the activities (Items 1-7 in section 8.1) are expected to result in complete take due to measures to minimize and mitigate any negative impacts as identified in section 8.4.

The possibility of invasion by nonnative aquatic species does exist and could result in partial or complete loss of both species. Loss to birds or other wildlife is more difficult to ascertain; however, predation and loss as observed in nature, can be expected to occur.

8.3 Impacts Likely to Occur as a Result of Take

Topminnow and/or pupfish stocked onto properties under this Agreement will originate from either captive refugia populations or from wild sites where the populations are large enough to maintain viable populations after the removal of reintroduction cohorts. Therefore, while the loss of individuals, or even entire populations of topminnow and pupfish is possible under this Agreement, no negative impacts to natural or other existing reestablished populations in the wild are expected. The recovery plans for the species anticipate that Level 3 populations are not expected to exist in perpetuity, and that recovery (e.g. downlisting or delisting) is not contingent upon the long-term establishment of Level 3 populations. Level 2 and 3 populations must meet the definition of "secure" as defined in the species recovery plans (USFWS 1993, Weedman 1999).

If elevated baselines are agreed upon for particular properties, it is expected that these may count towards recovery as Level 2 populations, and should exist for an extended time. However, if a population fails, reestablishment may be necessary, depending on reason for loss (see section 10.2).

8.4 Measures to Monitor, Minimize, and Mitigate Negative Impacts

Management actions such as major earthwork, removal of nonnative aquatic species, pesticide application, and other management activities expected to result in take, will be scheduled in advance, and notification, at least 30 days before the activities, will be provided to the Department. This will allow the Department the opportunity to relocate fish temporarily if deemed necessary by the Department in consultation with the Service.

If activities require long-term removal of fish, arrangements can be made to house them at alternative locations.

If mosquitofish occur in any habitat covered under this Agreement, removal efforts must be attempted before topminnow and/or pupfish are released. If other nonnative aquatic species occur at potential sites, utilization of those habitats will be decided on a site-specific basis.

Any loss of the populations due to such disturbances may require supplemental stockings of topminnow and/or pupfish. The Department will consult with the Service and criteria in the species' recovery plans to determine the appropriate source population for initial and supplemental stockings.

9.0 REPORTING AND MONITORING

This Agreement provides for two types of monitoring as required by Service policy (64 FR 32717) and Federal regulation (64 FR 32705): (1) compliance monitoring to ensure that all commitments in the Agreement are being met, and (2) biological monitoring to ensure that the biological goals of the Agreement are being met and to determine the effectiveness of its conservation program.

9.1 Compliance Monitoring

The Department or any authorized representative of the Department will ascertain compliance as necessary. Specific requirements of compliance monitoring are a maximum of four visits per year (and a minimum of one visit per two years) to each site subject to this Agreement to verify that all required conservation commitments are being properly implemented. Before any visit, Department monitoring personnel or representatives shall give notice to the Cooperator of not less than 14 days before the visit and shall arrange the visit so it is compatible with the landowner's schedule and needs. This monitoring requirement shall commence from the effective date of the Certificate of Inclusion for each affected Cooperator.

In addition, the Service is responsible for monitoring the Department's compliance with the ESA section 10(a)(1)(A) Permit. This may include audits of relevant Department files biennially.

9.2 Biological Monitoring

The Department and the Cooperator are jointly responsible for coordinating efforts to insure that annual monitoring and reporting related to implementation of the Agreement and fulfillment of its provisions are arranged. The biological monitoring will address the status and distribution of topminnow and/or pupfish populations established under this

Agreement. The biological monitoring may also address issues that require adjustment to the Agreement's conservation program through the Adaptive Management provisions described in section 10 of this Agreement. Specific biological monitoring requirements are as follows:

- 1. For any aquatic site on participating lands to which topminnow and/or pupfish have been stocked: one monitoring visit conducted one month after the stocking, one visit six months after the stocking, one visit one year after stocking, followed by at least one visit every year. The monitoring schedule described in this paragraph shall remain in effect unless the Department and the Cooperator determine that a more frequent or a less frequent schedule is appropriate.
- 2. Information to be collected during site visits described in paragraph (1) above shall consist of the following:
 - a. Type of site (stream, pond, wetland, etc.);
 - b. General description of the site and its condition, including water quality (water temperature, pH, conductivity, and dissolved oxygen);
 - c. Presence or absence, and distribution of topminnow and/or pupfish and at least approximate numbers of adults and juveniles;
 - d. Presence or absence, and distribution of nonnative aquatic species;
 - e. Color photos (35mm slides or digital photos) of the habitat taken at fixed points;
 - f. Land management activities that may result in take, if any;
 - g. A general threat assessment and recommendations for how to alleviate the threats; and,
 - h. Any other pertinent information.

9.3 Responsibility for Monitoring

Compliance monitoring under this Agreement will be funded and carried out by the Service or any authorized representative of the Service. Biological monitoring under this Agreement will be funded and carried out primarily through the joint efforts of designated State and Federal agencies, academic institutions, conservation organizations, or other entities. Biological monitoring activities described in this section will be conducted by the Cooperator and agency, academic, and conservation personnel in a

unique manner for each covered property as agreed upon by the Department and the Cooperator. The primary obligations of Cooperators with respect to biological monitoring will be to grant access to their properties by personnel conducting the monitoring, subject to reasonable advance notification. In addition, persons that can distinguish between topminnow and mosquitofish must conduct the biological monitoring.

9.4 Annual Reporting

1. Cooperator Reporting Responsibility

Each Cooperator will submit an annual report to the Department by February 1 that describes biological monitoring activities under the Agreement for the preceding year. If the Cooperator does not conduct the monitoring, it is the responsibility of the entity that conducted the monitoring to submit the annual report to the Department. Information required in the Cooperator's report is found in paragraph (2) of section 9.2.

2. Department Reporting Responsibility

The Department, as the permittee under this Agreement, shall submit one copy of a cumulative report describing biological monitoring activities under the Agreement for the preceding year to each of the Service's Arizona Ecological Services Office and Albuquerque Regional Office. The Department's annual report will be due by March 15 of each year throughout the term of the permit. If the first year of the Agreement is a partial year of six months or less, activities implemented in that year may be reported in the following year's report. Information required in the Department's annual report is as follows:

- a. A summary of the cumulative total of Cooperators enrolled in the Agreement at the time of preparation of the report;
- b. The cumulative total of topminnow and pupfish populations being managed under this Agreement, including a description of the status of the populations and their associated habitats;
- c. The status of each population within the covered area at the time of the report with respect to the Agreement's biological and recovery goals;
- d. Any Cooperators that enrolled under the Agreement in the preceding year, including copies of any related Certificates of Inclusion;
- e. Any topminnow and/or pupfish management activities that were implemented in the preceding year, including population establishments or habitat improvement

projects, and original source of topminnow and pupfish stocked under this Agreement;

- f. Funding sources that were used in the preceding year, funding uses for that year, and funding sources expected to be obtained in the following year;
- g. Any incidental take of topminnow and/or pupfish known or suspected to have occurred within the covered area in the preceding year and an explanation of the reasons for the take;
- h. Results of biological monitoring activities conducted in the preceding year, with supplemental information on biological or habitat-related problems that need to be addressed; and
- i. Any other pertinent information regarding the status of the Agreement's conservation program or implementation of the program.

10.0 Modifications and Adaptive Management

The Department agrees to meet annually, or more frequently if necessary and agreed upon, with the Service to review progress in implementing the Agreement and to review needs for adaptive management due to changing circumstances. Any major change in land use or natural changes in the watershed that affect the covered species or their habitats should be reported by the Department in writing to the designated Service representative, or by that representative or other cooperators in writing to the Department as soon as possible.

Amendments to the section 10(a)(1)(A) permit must be evaluated by all parties based on the effects that proposed amendments have on the habitat, individual species, and permitted actions. The Service must be consulted on all proposed amendments. Concurrence through a consensus will be sought among parties before implementation of any amended action. It is understood that unforeseen circumstances will not require the Department to provide additional habitats and mitigation above that designated in this Agreement, nor provide additional compensations above that provided for in this Agreement, without consent of the Department.

10.1 Adaptive Management

Adaptive management allows a conservation program to be adjusted from time to time to take into account new scientific information and to ensure that the program is as effective as possible. The Agreement will need to respond to specific management opportunities and needs as they arise. The Agreement therefore includes an Adaptive Management program to ensure flexibility and that the most up-to-date scientific information is used.

The need to adopt Adaptive Management modifications to the Agreement may result from four potential sources:

- 1. New scientific information concerning the biology, population dynamics, or status of topminnow and/or pupfish;
- 2. New scientific information concerning the effects of biotic or abiotic factors on topminnow and/or pupfish;
- 3. Information derived from the Agreement's monitoring program; and
- 4. Management needs or recommendations described under any updated Recovery Plans for topminnow and pupfish.

Two types of Adaptive Management modifications within the covered area can be implemented under this Agreement, depending on their scope and the process for incorporating them. These are termed: (1) major revisions to the Agreement, and (2) ongoing management adjustments. A major revision is defined as one triggered by the availability of substantial new scientific information, typically from a source not related to the Agreement, concerning any biological assumption or criterion upon which the conservation program is based and that would require modification of any of the Agreement's specific biological criteria or conservation measures. Major revisions would likely require that the 10(a)(1)(A) permit be amended to reflect any required new standards or management activities. This, in turn, would require mutual agreement between the Department and Service (the Agreement's signatories) and written formalization of the amendment following the Service's amendment procedures.

Ongoing management adjustments are defined based on the Agreement's monitoring program, and concerns any situation within the covered area that requires a management response, and that is within the scope of the existing Agreement. Examples of circumstances requiring ongoing management adjustments would be the identification of specific problems at specific topminnow and pupfish sites within the covered area (e.g. colonization by nonnatives, drought, or extirpation of a population); or the identification of specific management opportunities or needs that would benefit the conservation program (e.g. a natural habitat that, with improvement, could be upgraded from a Level 3 to a Level 2 population). The Department and Cooperators will typically address ongoing management adjustments collaboratively. Under the Agreement, sections 8 (Take) and 10.2 (Changed Circumstances) describe conditions that could potentially require ongoing management adjustments, as well as the standards that will be considered in determining the appropriate adjustment or response.

10.2 Changed Circumstances

Changed circumstances are defined by Federal regulation (50 CFR 17.3) as "changes in circumstances affecting a species or geographic area covered by a conservation plan [in this case,

the Agreement] that can reasonably be anticipated by plan developers and the Service and that can be planned for."

In the event of a changed circumstance, the Department and Cooperators will respond cooperatively as follows:

- 1. The cause of the circumstance will be determined, if possible;
- 2. An appropriate response will be determined. If a problem can be identified, the decision whether or not to correct the problem will be made based on the following factors:
 - a. The technical and logistical feasibility of correcting the problem, and the likelihood of long term success;
 - b. The biological importance of the population to the net conservation benefit of the species; and
 - c. Funding availability to undertake corrective action.

Administrators of this Agreement anticipate that three types of Changed Circumstances could occur within the covered area over the life of the Agreement:

- 1. <u>Drought</u>: Droughts are a periodic phenomenon in the arid environments of Arizona almost certain to occur over the life of the Agreement. During drought, the Department and Cooperators will monitor topminnow and pupfish population sites and habitat conditions in the covered area according to the needs of the situation and will implement corrective measures on a case-by-case basis. Responses to actual or potential drought conditions will include, as necessary and appropriate:
 - a. Improvements in water reliability at selected sites through water-hauling, well-drilling, deepening, or other means;
 - b. Salvage and relocation of topminnow and pupfish from desiccated sites to other sites or temporary holding facilities;
 - c. Reestablishment of extirpated populations when drought conditions cease; and
 - d. Other measures as appropriate and agreed upon.
- 2. <u>Invasion by nonnative organisms that may pose a threat to the population</u>: Colonization or inadvertent introduction of nonnative fish, bullfrogs, crayfish, or other predators into topminnow and/or pupfish habitat is also a possibility over the

life of the Agreement. Bullfrogs and crayfish are of special concern, because they can migrate substantial distances over land under the right conditions and are present throughout the state. Responses to colonization of habitats by nonnative species within the covered area will be addressed by the Department and Cooperators on a case-by-case basis and will include, as necessary and appropriate:

- a. Removal of existing nonnatives from new sites (and areas adjacent to new sites, when possible) before stocking of topminnow and pupfish;
- b. Periodic control and removal of nonnatives using available and appropriate means;
- c. Redefinition of an elevated baseline, if necessary and agreed upon by the Department, Service, and Cooperator(s);
- d. Adjustment of the Agreement's conservation program to incorporate new scientific information concerning nonnative migration, population dynamics; and:
- e. Other measures as appropriate and agreed upon.
- 3. <u>Failure of topminnow and/or pupfish populations</u>: It is expected that topminnow and/or pupfish populations within the covered area will, from time to time, fail as a result of one or more of the above factors or other factors. If and when previously extant topminnow and pupfish populations disappear or are in immediate peril (as determined by the Agreement's monitoring program), the Department and Cooperators will respond cooperatively as follows:
 - a. The cause of failure will be determined, if possible. The cause will likely be an adverse condition such as drought or invasion by nonnative predators and will usually have been identified in advance with an attempt made to correct it.
 - b. An appropriate response will be determined. If a problem can be identified, the decision whether or not to reestablish the topminnow and/or pupfish population will be made based on the following factors:
 - i. The technical and logistical feasibility of correcting the problem, and the likelihood of long term success;
 - ii. The biological importance of the population to the net conservation benefit of the species (section 6 of this Agreement);

- iii. The willingness of the Cooperator to reestablish the population; and
- iv. Funding availability to undertake corrective action and reestablish a new population.

Generally, the responsibility for monitoring, evaluating, and correcting changed circumstances will not lie with the Cooperator. Exceptions to this would include changed circumstances that are specific to a landowner's property (e.g. the presence of mosquitofish in a particular stock tank) and associated corrective measures that are clearly identifiable and within the normal scope of management activities (e.g. drying out a stock tank to rid it of mosquitofish). A Cooperator may undertake such measures with appropriate notification to the Department. Otherwise, the responsibility for implementing responses to changed circumstances deemed necessary by the Department will lie with appropriate state and Federal agencies, academic institutions, or other suitable conservation organizations.

10.3 Amendments to the Permit

The Department's section 10(a)(1)(A) permit may be amended in accordance with all applicable legal requirements in force at the time of the amendment, including, but not limited to, the ESA, National Environmental Policy Act, and Service permit regulations (currently these are codified in 50 CFR, Parts 13 and 17). Amendment of the permit would require, at a minimum: (1) a written explanation of why the amendment is needed; (2) an explanation of what, if any, effects the amendment would have on topminnow and pupfish; and (3) a *Federal Register* notice of the proposed amendment and 30 day public comment period.

10.4 Permit/Certificate Revocation

The Department's Permit or a Cooperator's Certificate of Inclusion may be suspended or revoked by either the Department or Service, acting jointly or separately, but only if: (1) the landowner has failed to satisfy a specific conservation commitment or commitments for which he or she is responsible; (2) the Service and the Department have made reasonable, good-faith efforts to cooperatively work with the landowner to correct the deficiency; (3) the deficiency remains uncorrected, even after the Department's and Service's good-faith efforts; and (4) written notice has been provided to the affected landowner alerting the landowner of the pending suspension or revocation a minimum of 30 days prior to the effective date of the suspension or termination. Similarly, the Service may suspend or revoke the Department's section 10(a)(1)(A) permit for cause in accordance with currently applicable Federal regulation (50 CFR Parts 13 and 17), or with any laws and regulations in force at the time of such suspension or revocation.

11.0 Additional Measures

1. For matters applicable to this Agreement, the Service Point of Contact (POC) is the person whose name appears on the signature block below. No change to this Agreement

shall be binding upon the Service or the Department unless and until in writing and signed by all parties.

- 2. Following section 22, Title 41, United States Code, it is further mutually agreed that no member of or delegate to Congress or resident commissioner, after their election or appointment, and either before or after they have qualified and during their continuance in office, shall be admitted to any share or part of this Agreement, or to any benefit to arise thereupon; but this provision shall not be construed to extend to this Agreement if made with a corporation for its general benefit.
- 3. This Agreement may be modified at any time by mutual written consent of all the parties as identified in section 10.3 of this Agreement.

12.0 SIGNATORIES

IN WITNESS WHEREOF, THE PARTIES HERETO have executed this Safe Harbor Agreement to be in effect as of the date last signed below.

APPLICANT, Arizona Game and Fish Department

BY _		Date
	Duane L. Shroufe, Director Arizona Game and Fish Department Phoenix, Arizona	
BY _		Date
	H. Dale Hall, Director Region 2, United States Fish and Wildlife Service Albuquerque, New Mexico	

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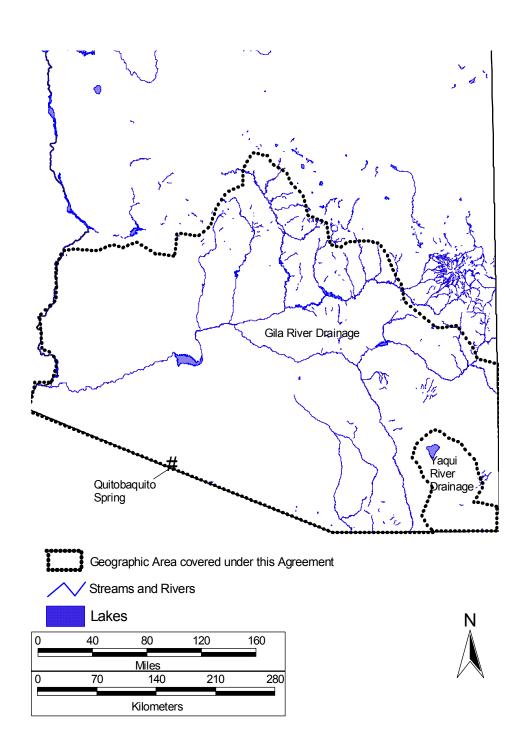
February 3, 2004

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Appendix 1. Figure of the geographic coverage of this Agreement. All non-federal lands (with the exception of Native American reservations) within this area are eligible under this Agreement.



Appendix 2. Safe Harbor Agreement Landowner Certificate of Inclusion Template

Certificate of Inclusion

In The Safe Harbor Agreement

For the Gila topminnow (*Poeciliopsis occidentalis*), Yaqui topminnow (*Poeciliopsis sonoriensis*), desert pupfish (*Cyprinodon macularius*), and Quitobaquito pupfish (*Cyprinodon eremus*) between the Arizona Game and Fish Department and U.S. Fish and Wildlife Service

This certifies that the participating landowner (Cooperator), who owns or administers property described in the attached Cooperative Agreement, is included within the scope of Permit No. [insert no.], issued by the U.S. Fish and Wildlife Service (Service) on [insert date] to the Arizona Game and Fish Department (Department) under the authority of section 10(a)(1)(A) of the Endangered Species Act of 1973, as amended, 16 U.S.C. 15389(a)(1)(A). Such Permit authorizes certain activities by Cooperators as part of a Safe Harbor Agreement to establish populations of endangered topminnow and/or pupfish. Following that Permit and this Certificate, the holder of this Certificate is authorized to engage in any otherwise lawful activity on the above described property that may result in the incidental taking of the topminnow and pupfish, as appropriate, subject to the terms and conditions of such Permit and the Cooperative Agreement entered into pursuant thereto by the Arizona Game and Fish Department and [insert Cooperator's name] on [insert date]. By signing this Certificate of Inclusion, the Cooperator agrees to carry out all assigned conservation measures as described in the Agreement and in the attached Cooperative Agreement for a period of [insert no. of years Certificate is in effect] years.

Director Arizona Game and Fish Department	Date	
Cooperator [insert name]	Date	
Concurrence, U.S. Fish & Wildlife Service Field Supervisor, Arizona Field Office, Phoenix	Date	

WITNESSETH

WHEREAS, the Gila topminnow, Yaqui topminnow, desert pupfish, and Quitobaquito pupfish are listed as endangered species under the Federal Endangered Species Act of 1973, as amended (Act); and,

WHEREAS, the Service and Department have entered into the Safe Harbor Agreement pursuant to the authorities of section 10(a)(1)(A) of the Act and associated Service policy and Federal regulation to establish a conservation program for topminnow and pupfish in Arizona and to provide for regulatory assurances to non-federal landowners who own lands in Arizona and who enter into the Safe Harbor Agreement with the Service and Department; and,

WHEREAS, the Service and Department are signatories to the Safe Harbor Agreement, while individual non-federal landowners within Arizona may participate in the Safe Harbor Agreement's conservation program and receive its regulatory assurances through this Certificate of Inclusion issued by the Department to the participating landowner; and,

WHEREAS, the Safe Harbor Agreement contemplates that cooperation by agencies and organizations in addition to the signatories and participating landowners will be necessary and desirable in ensuring comprehensive implementation of the Safe Harbor Agreement and long-term conservation of topminnow and pupfish in Arizona; and,

WHEREAS, other organizations or Federal or state agencies who are not signatories to the Safe Harbor Agreement may, nevertheless, have certain regulatory or land management authorities or responsibilities in Arizona, or may themselves be engaged in topminnow and pupfish conservation efforts within the state; and,

WHEREAS, such other agencies and organizations (including, but not limited, to the Arizona State Land Department; Arizona County and Municipal governments, and The Nature Conservancy) may elect or desire to become cooperators in the Safe Harbor Agreement's conservation program;

NOW, THEREFORE, the parties to this Agreement mutually agree and understand as follows:

- **1.** <u>Involved Parties.</u> This Certificate of Inclusion, between the Arizona Game and Fish Department (Department) and [insert name of Cooperator], is intended to promote good land stewardship by assisting the Cooperator in carrying out actions to establish topminnow and/or pupfish populations on land owned by the Cooperator.
- **2.** Enrolled Property. Cooperator owns property at [insert street and city address and/or legal description] in [insert county name] County, Arizona, that contains habitat that suitable for topminnow and/or pupfish as defined in the Safe Harbor Agreement (SHA) between the Department and the Service. The Department will enroll this property under the SHA, as shown on the attached property map. Other species (listed and non-listed) of wildlife may also occur on the property, but will not be covered for incidental take under the terms of the Department's Safe Harbor Permit.

3. Access to Enrolled Property. The Cooperator agrees to allow the Department or their representatives, reasonable access to his or her property for the purposes of (a) assessing the habitat value of his or her property, (b) stocking topminnow and/or pupfish, (c) ascertaining that the habitats are suitable and are being maintained in the manner required by the SHA, and (d) monitoring the topminnow and/or pupfish populations as required by the SHA. Additionally, the Cooperator agrees to allow the Service reasonable access for the purposes of (a) conducting compliance monitoring and (b) conducting biological monitoring in cooperation with the Department.

The Department and the Cooperator will coordinate a schedule to conduct visits to the property at times that avoid inconvenience to the Cooperator or disruption of the Cooperator's use of the property. The Department shall give the Cooperator at least 14 days advance notice of its desire to enter the property for any of the above purposes, and the Cooperator shall not unreasonably withhold permission for such entry.

- **4.** <u>Liability.</u> The Cooperator assumes no liability for injury to any employee or representative of the Department in the course of any visit to the property under this paragraph, except insofar as such injury is the result of the Cooperator's negligence. The Department or their representatives shall not be liable for any damage to the property of the Cooperator arising from any visit to the property pursuant to this paragraph, except insofar as such damage is the result of the Department's negligence.
- **5.** <u>Baseline Determination.</u> Based upon the site survey conducted on the Cooperator's property on (insert month/day/year), the following has been determined:
 - **A.** Physical description of property. [Description should include (a) the mailing address or legal description of the property to be enrolled; (b) a thorough habitat analysis including photos; and, (d) any other relevant information].
 - **B.** Map of Property. (Attach on separate sheet a map of the entire property with the enrolled portions clearly outlined and marked as habitat to be stocked with topminnow and/or pupfish).
 - **C.** <u>Baseline Determination</u> (Description will include the results of the baseline surveys, as well as the final baseline determination as agreed upon in writing by all parties).
- **6.** <u>Terms and Conditions.</u> This Cooperative Agreement is subject to the following additional terms and conditions:
 - **A.** <u>Cooperator Responsibility.</u> The Cooperator agrees to all Terms and Conditions as identified in section 4.3 of the Safe Harbor Agreement. The Cooperator agrees to notify the Department before taking the property back to baseline conditions or other land management actions that could result in take of the species.

B. <u>Length of the Cooperative Agreement.</u> This Cooperative Agreement will be valid from the date of the last signature on this Certificate of Inclusion until at least [insert date as agreed upon by all parties], but may not exceed [insert the Department's Permit expiration date], unless the Permit is extended.

C. Restrictions on Taking Property Back to Baseline:

- i. <u>Type of Take</u>. Topminnow and pupfish may not be "taken" except as defined in section 8 of the Safe Harbor Agreement.
- **ii.** <u>Permit Duration.</u> This Certificate of Inclusion may be extended if the Department's Permit is renewed and that renewal allows for such extension.
- **D.** <u>Notification.</u> The Cooperator agrees to notify the Arizona Game and Fish Department not less than 30 days before any activity that will take the property back to baseline conditions. The Cooperator also agrees to allow the Department or Service to access the property to rescue any topminnow and/or pupfish individuals, if possible and appropriate, before taking the property back to baseline conditions.
- **E.** Reporting Requirements. The Cooperator understands that to fulfill the responsibilities of the SHA, the Department must report all monitoring activities conducted in accordance with the SHA to the Service.
- **F. Early Termination.** The Cooperator may terminate this Certificate of Inclusion at any time for circumstances beyond his or her control, upon written notification to the Department. Such termination shall not affect the Cooperator's authorization under the Safe Harbor Permit to incidentally take any topminnow or pupfish existing at the time of termination that is not part of the landowner's baseline.

The Cooperator may terminate this Certificate of Inclusion for any other reason, upon written notification to the Department. However, such termination shall extinguish the Cooperator's authority to incidentally take topminnow/pupfish under the Safe Harbor Permit

- **G.** <u>Transfer of Property.</u> The Cooperator will notify the Department no less than 60 days before selling or transferring the enrolled property to another entity, to provide the Department the opportunity to secure the successor's agreement to continue the identified Safe Harbor activities.
- **H.** <u>Unforeseen Circumstances.</u> If, before the expiration of the Permit to be issued to the Department, the Department should cease to exist or cease to be able to continue to administer the Safe Harbor program, and no other entity satisfactory to the Service is

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willing to assume the Department's responsibilities as administrator of the program, the Department will relinquish its Permit to the Service. In the event of the foregoing, the Service shall convert the Certificates of Inclusion that have been previously issued by the Department to participating landowners into freestanding permits that authorize the same actions by the participating landowners as had been authorized by the Certificates of Inclusion, provided the participating landowners agree to fulfill the management activities for their property, as well as the administrative, monitoring, and reporting requirements, for the enrolled property, as outlined in this Certificate of Inclusion and the SHA.